Lukas Thommen: *An Environmental History of Ancient Greece and Rome*. Cambridge University Press, Cambridge – New York 2012. ISBN 978-1-107-00216-6 (hb), ISBN 978-0-521-17465-7 (pb). XI, 186 pp. GBP 45, USD 60 (hb), GBP 17.99, USD 29.99 (pb)

This book is a revised translation of Lukas Thommen's *Umweltgeschichte der Antike* (2009) with one chapter on the environmental history of Roman Britain having been added. The original book was a useful short introduction (188 pp.) to this subject, the interest of which is illustrated by the mere fact that this English translation has been published, even by Cambridge University Press. The quality of the photographs has greatly improved, and the Introduction (pp. 1–16), six pages longer than the original *Einleitung*, is good preliminary reading for any student interested in this field of study – not least because it includes a compact, but comprehensive overview of recent work along with "Further Reading" (pp. 144–47) and the Bibliography (pp. 152–79), which, however, has only partly been updated.

Some curious mistakes occur in the translation. For instance, Homer's similes (Thommen: *Gleichnis*) are translated as 'parables' (pp. 31, 47), Greek myths as 'legends' (Thommen: *Mythen*) and animal choruses in comedy as 'animal choirs' (Thommen: *Tierchöre*) (pp. 46–47). The translator has chosen to use the Loeb translations, which is regrettable at least as regards two important passages of classical literature on human relations with the environment. The chorus song about the superiority of man in *Antigone* (332–352) includes the word *deinos*, which has been translated as 'wondrous' (p. 30), while the more recent Loeb translation (1994) by Hugh Lloyd-Jones has 'formidable' and Thommen himself translates (following the famous translations by Martin Heidegger and Friedrich Hölderlin) the word as 'ungeheuer' (*Umweltgeschichte der Antike* p. 32). Cicero's passage about 'the second nature' in *nat. deor.* 2,152, which became a catch phrase in early modern European civilized parlance, has been translated as 'second world' (p. 77), while Thommen has 'zweite Natur' (*Umweltgeschichte der Antike* p. 76).

The preliminary discussion about the terminology (pp. 3–10), which clearly shows the (usual) difficulty of applying modern terms to the ancient world, is also more extensive in this volume. Furthermore, Thommen handles the range of environmental history with more depth than in the original (pp. 10–13), citing, for instance, R. P. Sieferle and V. Winiwarter regarding environmental determinism and emphasizing human culture as an organizational pattern. In some ways, this justifies Thommen's policy to treat both the big environmental issues like geographic space and details of the living environment of humans, although for me the concentration on the built environment and social customs sometimes turns this short history of environmental issues in antiquity into social history (e.g. the descriptions of the conduct rules in Greek symposia, nuances of Roman meals and different kinds of Roman taverns). The fact that the author has much to say on the eruption of Vesuvius may reflect the fact that the book is based on Thommen's lectures. The last days of Pompeii might be more exciting for students than, for example, climate change during the third century CE, to which Thommen refers only in passing (pp. 135).

Otherwise, Thommen has the ability to say a great deal succinctly, which is displayed well in the last chapter, added to this English translation, "The environment in Roman Britain" (pp. 132–140). Besides the fact that it contains three illustrative maps (for instance, main mining areas and products), it paints with bold brush strokes the picture of the Roman impact – both for good and for bad – on the human and natural environment of Britain during Roman rule.

Thommen speaks about the "paradoxical relationship between human and animal" (p. 95), by which he means that animals were revered "as an incarnation of nature" (p. 45), but also seen as dangerous threat, which – like 'nature' on the whole – should be overcome. We may question how far this paradox is a feature of Greco-Roman antiquity or reflects our universally ambiguous relationship with our own animality and with other animals. Some aspects of the intellectual roots of our ecological crises may lie in antiquity and it is first and foremost the task of philosophers and historians of ideas to ponder on the complexity of the relationship between man and 'nature' in the ancient world.

Thommen's work, the original as well as this slightly expanded translation, justifies its place as introductory reading to such environmental issues as climate, agriculture, foresting and deforestation, food and water supply, population and built environment, mining and urban problems in the Greco-Roman world.

Tua Korhonen

JOHN R. Senseney: *The Art of Building in the Classical World: Vision, Craftsmanship, and Linear Perspective in Greek and Roman Architecture*. Cambridge University Press, Cambridge – New York 2011. ISBN 978-1-107-00235-7. XV, 245 pp. USD 90.

Buildings represent some of the most tangible and durable evidence of classical culture. They can be observed, measured and interpreted on the basis of what is left, but many aspects remain hard to understand because the whole building process from idea to design to actual construction work cannot be completely reconstructed. One of the problems is that we know little about the tools and concepts used in the design of buildings. Some information can be gleaned from surviving literary evidence, but many other details have to be reconstructed on the basis of the buildings themselves. John R. Senseney courageously tackles the problems of understanding ideas related to buildings and their design as well as the importance of drawing on the creativity of Greek and Roman architecture. His data come from the writings of Vitruvius, the scant remains of drawings preserved from antiquity and, of course, the buildings themselves.

The book is divided into an introduction and four main chapters. The first concerns ideas about architecture or more specifically how Greek temples were designed before the Hellenistic period. The second chapter moves on to discuss the connection between world views and building, using Plato's and Aristophanes' texts to assess designs of theatres and round buildings in the Greek world. The third chapter explores the development of technical drawing, particularly the relationship of full-scale and reduced-scale drawing using the refinements of entasis and curvature and the fluting on columns as examples. The final chapter deals with the way practices of drawing influenced how the world was seen and consequently also how buildings could be designed. The chronological emphasis is on the Hellenistic world with some examples from the Roman period as well. The book ends in an excursus on the cosmic mechanism in the writings of Plato and Vitruvius; this is followed by three short appendices analysing surviving and hypothetical drawings discussed in the main chapters. The illustrations are beautifully executed and clear. Their presence makes the occasionally rather complicated text somewhat easier to understand.